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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/698,016	10/31/2003	Thomas Frietsch	1509-453	7146
	590 01/17/200 CKARD COMPANY	EXAMINER		
	0, 3404 E. HARMON	DAILEY, THOMAS J		
INTELLECTUAL PROPERTY ADMINISTRATION FORT COLLINS, CO 80527-2400			ART UNIT	PAPER NUMBER
			2196	
	um.			
SHORTENED STATUTORY	PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE	
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Please find below and/or attached an Office communication concerning this application or proceeding.

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	Application No.	Applicant(s)			
Office Action Summary	10/698,016	FRIETSCH, THOMAS			
Office Action Summary	Examiner	Art Unit			
	Thomas J. Dailey	2196			
The MAILING DATE of this communication appreciation ap	pears on the cover sheet wit	n the correspondence address			
A SHORTENED STATUTORY PERIOD FOR REPL WHICHEVER IS LONGER, FROM THE MAILING D  - Extensions of time may be available under the provisions of 37 CFR 1. after SIX (6) MONTHS from the mailing date of this communication.  - If NO period for reply is specified above, the maximum statutory period  - Failure to reply within the set or extended period for reply will, by statute Any reply received by the Office later than three months after the mailin earned patent term adjustment. See 37 CFR 1.704(b).	NATE OF THIS COMMUNIC 136(a). In no event, however, may a re- will apply and will expire SIX (6) MONT e, cause the application to become ABA	CATION.  Exply be timely filed  THS from the mailing date of this communication.  ANDONED (35 U.S.C. § 133).			
Status					
1)⊠ Responsive to communication(s) filed on <u>31 October 2003</u> .					
2a) ☐ This action is <b>FINAL</b> . 2b) ☑ This	This action is <b>FINAL</b> . 2b)⊠ This action is non-final.				
3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is					
closed in accordance with the practice under the	Ex parte Quayle, 1935 C.D.	11, 453 O.G. 213.			
Disposition of Claims					
4)⊠ Claim(s) <u>1-27</u> is/are pending in the application	, <b>)</b> .				
4a) Of the above claim(s) is/are withdra					
5) Claim(s) is/are allowed.					
6)⊠ Claim(s) <u>1-27</u> is/are rejected.					
7) Claim(s) is/are objected to.					
8) Claim(s) are subject to restriction and/o	or election requirement.				
Application Papers					
	or				
9) The specification is objected to by the Examine 10) The drawing(s) filed on is/are: a) acc		ov the Examiner			
Applicant may not request that any objection to the					
Replacement drawing sheet(s) including the correct	•				
11) The oath or declaration is objected to by the E	xaminer. Note the attached	Office Action or form PTO-152.			
Priority under 35 U.S.C. § 119					
•		440(=) (=) == (0			
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of:					
1. ☐ Certified copies of the priority document	ts have been received	•			
2. Certified copies of the priority document		oplication No.			
3. Copies of the certified copies of the prior	•				
application from the International Burea		·			
* See the attached detailed Office action for a list	of the certified copies not	received.			
·					
Attachment(s)		•			
1) X Notice of References Cited (PTO-892)	4) Interview S	ummary (PTO-413)			
2) DNotice of Draftsperson's Patent Drawing Review (PTO-948)	Paper No(s	)/Mail Date			
3) Niformation Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date <u>April 2004</u> .	5)  Notice of In 6)  Other:	formal Patent Application			

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#### **DETAILED ACTION**

1. Claims 1-27 are pending in this application.

# Claim Objections

2. Claim 20 is objected to for lack of antecedent basis. The claim refers to "the program means" (line 1) wherein claim 18 and 19 no such program means is recited. The remainder of this office action assumes claim 20 to be referring simply to the program recited in claim 18.

### Claim Rejections - 35 USC § 101

3. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

- Claims 15-20 are rejected under 35 U.S.C. because the claimed invention is directed to non-statutory subject matter.
- 5. As to claim 15, on lines 1-2, it recites, "A *storage medium or device* storing a computer program for initiating a discovery procedure for a network node, the computer program causing the network to perform a *method comprising...*" As the claim is directed to both an apparatus and the method steps of using the apparatus, the claim is directed to neither a "process" nor a "machine," but rather overlaps two different statutory classes of invention set forth in 35 U.S.C. 101

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which is drafted so as to set forth the statutory classes of invention in the alternative only.

# Claim Rejections - 35 USC § 112

6. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

- 7. Claims 15-20 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.
- 8. As to claim 15, on lines 1-2, it recites, "A *storage medium or device* storing a computer program for initiating a discovery procedure for a network node, the computer program causing the network to perform a *method comprising...*" It is unclear what the applicant intends to claim, as it claims both an apparatus and method steps used by the apparatus.

### Claim Rejections - 35 USC § 102

9. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

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A person shall be entitled to a patent unless -

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

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- 10. Claims 1-6, 9-11, 13-15, 18-19, 21-24, and 26 are rejected under 35

  U.S.C. 102(b) as being anticipated by Sistanizadeh et al. (US Pat. 5,790,548),
  hereafter "Sistanizadeh."
- 11. As to claim 1, Sistanizadeh discloses a method of discovering a network node (Abstract), the method comprising the steps of:

transmitting an access request from the network node (Fig. 7, label 710, with the DHCP Request reading on the "access request") to a network server (Fig. 7, label 712) of a computer network, the network being arranged for coupling the network node to the computer network (Fig. 7 and column 12, lines 8-14),

transmitting a discovery request from the network server to a discovery server (Fig. 7, label 714, with the DNS Update reading on the "discovery request"), the discovery request comprising an identifier of the network node (column 12, lines 21-30), and

performing a discovery procedure of the network node by the discovery server using the identifier (column 12, lines 21-30, the IP address is the "identifier").

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12. As to claim 9, Sistanizadeh discloses a method of coupling a user device to a computer network (Abstract), the method comprising the steps of:

receiving an access request from the user device (Fig. 7, label 710, with the DHCP Request reading on the "access request") by a network server (Fig. 7, label 712) of the computer network, the network server being arranged for coupling the user device to the computer network (Fig. 7 and column 12, lines 8-14), and

sending a discovery request from the network server to a discovery server (Fig. 7, label 714, with the DNS Update reading on the "discovery request") to request a discovery procedure to be performed by the discovery server for the network node (column 12, lines 21-30).

13. As to claim 15, Sistanizadeh discloses a storage medium or device storing a computer program for initiating a discovery procedure for a network node (Abstract), the computer program causing the network to perform a method comprising:

receiving an access request from the network node (Fig. 7, label 710, with the DHCP Request reading on the "access request") for coupling the network node to the computer network (Fig. 7 and column 12, lines 8-14), and

generating a discovery request for initiating a discovery procedure for the network node in response to the access request (column 12, lines 21-30, with the DNS Update reading on the "discovery request").

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14. As to claim 18, Sistanizadeh discloses a storage medium or device storing a computer program for performing a discovery procedure (Abstract), the computer program being arranged for performing steps including:

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receiving a discovery request from a network server (Fig. 7, label 712, with the DNS Update reading on the "discovery request"), the discovery request comprising an identifier of a network node (column 12, lines 21-30, the IP address is the "identifier"), and

performing a discovery procedure for the network node using the identifier (column 12, lines 21-30).

15. As to claim 21, Sistanizadeh discloses a network server (Fig. 7, label 712) for coupling a network node to a computer network (Abstract), the network server being arranged for:

receiving an access request from the network node (Fig. 7 and column 12, lines 8-14, with the DHCP Request reading on the "access request"), and sending a discovery request to a discovery server (Fig. 7, label 714, with the DNS Update reading on the "discovery request") in response to the access request, the discovery request comprising an identifier of the network node (column 12, lines 21-30, the IP address is the "identifier").

16. As to claim 22, Sistanizadeh discloses a domain controller (Fig. 7, label 712), comprising:

an authentication component for processing an access request from a network node (inherent in Fig. 7, label 712 and column 12, lines 8-14, with the DHCP Request reading on the "access request") and

a discovery initiation component for generating a discovery request (Fig. 7, label 712, with the DNS Update reading on the "discovery request") in response to successful authentication of the network node by the authentication component (inherent in Fig. 7, label 712 and column 12, lines 21-30).

17. As to claim 24, Sistanizadeh discloses a dynamic host configuration protocol server (Fig. 7, label 712) comprising:

a dynamic host configuration protocol component for coupling an IP address to a network node in response to an IP address request received from the network node (Fig. 7 and column 12, lines 8-14, with the DHCP Request reading on the "IP address request"), and

a discovery initiation component for generating a discovery request (Fig. 7, label 712, with the DNS Update reading on the "discovery request") in response to the IP address request (Fig. 7 and column 12, lines 21-30), the discovery request comprising the IP address to enable a discovery server (Fig. 7, label 714) to perform a discovery procedure for the network node identified by the IP address (column 12, lines 21-30).

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18. As to claim 26, Sistanizadeh discloses a discovery server (Fig. 7, label 714) comprising:

a memory component for storing an IP address received as part of a discovery request from a dynamic host configuration protocol server (Fig. 7, label 714 and column 12, lines 21-30, with the DNS Update reading on the "discovery request"), and

a discovery program component for performing a discovery procedure of a network node being identified by the IP address stored in the memory component in response to the discovery request (column 12, lines 21-30).

- 19. As to claims 2 and 13, Sistanizadeh discloses processing the access request by the network server (column 12, lines 8-14) and generating the discovery request by the network server (Fig. 7, label 712, with the DNS Update reading on the "discovery request") after acceptance of the access request (column 12, lines 21-30).
- 20. As to claims 3 and 23, Sistanizadeh discloses the access request is a log on request (Fig. 7 and column 12, lines 8-14).
- 21. As to claim 4, Sistanizadeh discloses the network server being a domain controller (Fig. 7, label 712, a DHCP server is a domain controller).

22. As to claim 5, Sistanizadeh discloses the access request is an Internet protocol address request (column 12, lines 8-14).

- 23. As to claim 6, Sistanizadeh discloses the network server being a dynamic host configuration protocol server (Fig. 7, label 712).
- 24. As to claim 10, Sistanizadeh discloses the user device is a portable client computer (Fig. 2, labels 48 or 42) and the access request is a log on request (Fig. 7 and column 12, lines 8-14).
- 25. As to claim 11, Sistanizadeh discloses the user device is a computer peripheral (Fig. 2, labels 48 or 42) and the access request is a log on request (Fig. 7 and column 12, lines 8-14).
- 26. As to claim 14, Sistanizadeh discloses temporarily coupling the network node to the computer network by a docking station (Fig. 2, labels 48 or 42, in this embodiment the node is a laptop and this will inherently be temporarily coupled to the network via a docking station).
- 27. As to claim 19, Sistanizadeh discloses the program is adapted to store identifiers of network nodes in a buffer memory (inherent in column 12, lines 8-14).

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# Claim Rejections - 35 USC § 103

28. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

- (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 29. Claims 7, 12, 16, 17, and 25 are rejected under 35 U.S.C. 103(a) as being unpatentable over Sistanizadeh as applied to claims 1, 9, and 15, respectively, in view of Osanai et al. (US Pub. No. 2003/0002075), hereafter "Osanai."
- 30. As to claim 7, Sistanizadeh discloses:

responding to a subsequent access request received by the network server (Fig. 7, label 712, with the DHCP Request reading on the "access request") by transmitting a subsequent discovery request in response to the subsequent access request (Fig. 7, label 712 and column 12, lines 21-30, with the DNS Update reading on the "discovery request").

Sistanizadeh does not disclose:

storing a time stamp of the access request by the network server, and

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transmitting the discovery request only if the subsequent access request is

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separated by at least a predetermined amount of time from the time stamp.

Osanai discloses:

storing a time stamp of the access request by the network server ([0040],

lines 1-15), and

transmitting the discovery request only if the subsequent access request is

separated by at least a predetermined amount of time from the time stamp

([0040], lines 1-15).

Therefore it would have been obvious to one of ordinary skill in the art at the

time of the invention to combine the teachings of Sistanizadeh and Osanai in

order to optimize the time interval between requests thereby mitigating conflicts

and allowing the system to be more effective (Osanai [0011]).

31. As to claim 12, Sistanizadeh discloses:

receiving a subsequent access request from the network node (Fig. 7, label

710, with the DHCP Request reading on the "access request"), the subsequent

access request being for renewed coupling of the network node to the computer

network (Fig. 7 and column 12, lines 8-14).

Sistanizadeh does not disclose:

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determining whether the renewed access request is spaced from the access request by at least a predetermined amount of time; and if the renewed access request is spaced from the access request by at least the predetermined amount of time, sending a renewed discovery request to the discovery server to request a renewed discovery procedure to be performed for the network node.

#### Osanai discloses:

determining whether the renewed access request is spaced from the access request by at least a predetermined amount of time ([0040], lines 1-3); and

if the renewed access request is spaced from the access request by at least the predetermined amount of time, sending a renewed discovery request to the discovery server to request a renewed discovery procedure to be performed for the network node ([0040], lines 3-15).

Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to combine the teachings of Sistanizadeh and Osanai in order to optimize the time interval between requests thereby mitigating conflicts and allowing the system to be more effective (Osanai [0011]).

### 32. As to claim 16, Sistanizadeh does not disclose:

determining whether a subsequent access request, which is received after the access request, is spaced from the access request by at least a predetermined amount of time, whereby the discovery request is only generated if the

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subsequent access request is spaced from the access request by at least a predetermined amount of time.

#### Osanai discloses:

determining whether a subsequent access request, which is received after the access request, is spaced from the access request by at least a predetermined amount of time ([0040], lines 1-3), whereby the discovery request is only generated if the subsequent access request is spaced from the access request by at least a predetermined amount of time ([0040], lines 3-15).

Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to combine the teachings of Sistanizadeh and Osanai in order to optimize the time interval between requests thereby mitigating conflicts and allowing the system to be more effective (Osanai [0011]).

33. As to claim 17, Sistanizadeh does not disclose the access request is time stamped.

Osanai discloses the access request is time stamped ([0040], lines 1-15).

Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to combine the teachings of Sistanizadeh and Osanai in order to optimize the time interval between requests thereby mitigating conflicts and allowing the system to be more effective (Osanai [0011]).

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34. As to claim 25, Sistanizadeh does not disclose the discovery initiation component

being arranged to generate the discovery request only if at least a predetermined

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amount of time has passed since a previous discovery request for the network

node.

Osanai discloses the discovery initiation component being arranged to generate

the discovery request only if at least a predetermined amount of time has passed

since a previous discovery request for the network node ([0040], lines 3-15)).

Therefore it would have been obvious to one of ordinary skill in the art at the

time of the invention to combine the teachings of Sistanizadeh and Osanai in

order to optimize the time interval between requests thereby mitigating conflicts

and allowing the system to be more effective (Osanai [0011]).

35. Claims 8, 20, and 27 are rejected under 35 U.S.C. 103(a) as being unpatentable

over Sistanizadeh as applied to claims 1, 18, and 26, respectively, in view of

Dawes et al. (US Pat. 6,411,997), hereafter "Dawes."

36. As to claims 8, 20, and 27, Sistanizadeh does not disclose polling the network

node to discover at least one of network topology, network node type, network

node status and network node configuration information.

Dawes discloses polling the network node to discover at least one of network topology, network node type, network node status and network node configuration information (column 12, lines 1-24, "total traffic measured so far" is network node status).

Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to combine the teachings of Sistanizadeh and Dawes in order to allow for the discovery server to contain information about the network and thereby allowing for easier management of the network.

#### Conclusion

37. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Thomas J. Dailey whose telephone number is 571-270-1246. The examiner can normally be reached on Monday thru Friday; 7:30am - 4:00pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Nabil El-Hady can be reached on 571-272-3963. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

TJD

01/04/2007

NABIL M. EL-HADY
SUPERVISORY PATENT EXAMINER

N. Effort